urethra being only a *cul de sac*, while the urine escapes from two minute orifices 1cm. further back on the under side of the organ. The fingers of both hands are unsymmetrically hypertrophied. The right leg is 1½ inches shorter, and 1½ inches greater in circumference than the left. Its bones are bent at an angle of 135°, opening backward, and the fold so produced is occupied by a row of small nodules—keloids. Left foot normal. On right foot, only great toe free, the rest united—Syndactylism. In a furrow near the end of the mass so formed, rudimentary nails are visible. At seven months, and at one year, the child was measured again, and the hypertrophied parts were found to have approximately preserved their proportion to that of the rest of the body.

That the hypertrophy should affect as many as three extremities is considered remarkable. M. concludes his article with a consideration of the causes of abnormal growth of the extremities, giving copious references. He lays some stress on the twisting of the cord, suggesting that it may have been knotted about the deformed leg, and that the disturbance of circulation so caused may have had something to do with the conditions found. He points out that, to whatever cause we may attribute them, general giant growth and acromegaly are apt to come on at times when there is a great change taking place in the circulation—at puberty and at the menopause. The trophic influence of the nervous system is also dwelt upon. An excellent picture of the child, and measurements of the limbs are given.

C. L. ALLEN.

PULMONARY HYPERTROPHIC OSTEO-ARTHROPATHY.

Goodlee (Brit. Med. Jour., July 11 and 18, 1896) reports several cases of this affection to which he called attention long before (1890) Marie's description and classification (1895), but adds, "It is a poor satisfaction to be able to claim that one was the first to describe a particular disease, if it is necessary to add that the case was imperfectly observed, and that its real nature was not recognized. I am afraid, however, that this is true; and it is at all events clear that most of the cases which had been reported as examples of the disease, have had actual mischief in the joints, and some have suffered from enlargements of the bones."

The first case is of interest as it ended in complete recovery. "A young man had retained for some years in his pleura a long piece of India rubber tubing which had been been imperfectly secured at the time of the original opening. The swelling over the wrists and knees and ankles was very marked as was the clubbing of fingers and toes, and I do not doubt that many would have thought that there was enlargement of the bones and affection of the joints. I cannot, indeed, prove that such was not the case, but the swelling quite disappeared after the removal of the tube and the closure of the empyema."

Case 2 is probably one of arthritis complicating chronic empyema, although there seemed to be enlargement of the lower end of either femur and the upper end of either tibia.

In case 3 there was some swelling of the wrists and ankles during the existence of a chronic empyema that finally closed. Although there was some clubbing of the fingers, this case could scarcely be considered as belonging to the disease in question, but is of some interest as constituting a possible transition form.

Case 4 is somewhat similar, and the author calls it polyarticular rheumatoid arthritis. The joint trouble followed a pulmonary abscess and prolonged suppuration of tubercular glands.

Case 5 the author considered to be a "genuine case." A man of 29 was said to have had a cough since infancy. For three years the expectoration had been offensive, and six months before examination the ankles and knees had begun to be swollen and painful. From the examination a diagnosis of pulmonary tuberculosis of the fibroid type was made, but as no tubercle bacilli could be found, it was provisionally changed to bronchiectasis. Some of the interphalangeal joints, the wrists, the knees, and ankles were enlarged, and the toes were markedly clubbed, but the author thinks an enlargement of the bones exceedingly doubtful.

Case 6, a man of 25, was also thought to be typical. Over two years before examination he had an attack of what seems to have been acute pleurisy followed by cough which persisted with the expectoration of muco-pus. The fingers had been clubbed and the knee joints swollen for two years, and examination showed a similar condition of the toes and ankles; but the author is inclined to think the bones are not enlarged, and a skiagraph of the hand showed the phalanges to be normal. PATRICK (Chicago).

THE REFLEX ARC CONCEPT IN PSYCHOLOGY.

Psychological Review, July, 1896.

The common view of the so-called "Reflex Arc" is concisely stated by Baldwin (Princeton) in his analysis of reactive consciousness as comprising three elements corresponding to the three elements of the nervous arc. First, the receiving consciousness—the stimulus, say a loud, unexpected sound; second, the attention involuntarily drawn—the registering element; and, third, the muscular reaction following upon the sound—say flight from fancied danger. Prof. John Dewey (Chicago), however, differs from the above, maintaining that it is a circle and not an arc. The following is the gist of his argument: "A sound is an act of hearing, and muscular response is involved in this act, as well as sensory stimulus, *e. g.*, posture of head and tension of ear muscles for the reception of the sound. It is just as true to say that the sensation of sound arises from a motor response as that the running away is a response to the sound. We do not have first a sound and then activity of attention, unless sound is taken as mere nervous shock or physical event, not as conscious value. The conscious sensation of sound depends upon the motor response having already taken place; it is the motor response or attention which constitutes that which finally becomes the stimulus to another act. The final "element," the running away, is sensory-motor, and is also a co-ordination, and this sensory-motor co-ordination is not a new act supervening upon what preceded, for the sound-experience must persist as a value in the running—to keep it up—to control it. The motor reaction involved in the running occurs to change the sound—to get rid of it, and is, therefore, not merely a reaction to the sound, but *into* it. It is a circuit, not an arc, and this circuit is more truly organic than reflex, because the motor response determines the stimulus just as truly as sensory stimulus determines movement, for the movement is only for the sake of determining the stimulus—of fixing what kind of a stimulus it is—of interpreting it.

He sums up his position thus: "The circle is a co-ordination, some of whose members have come into conflict with each other. It is the temporary disintegration and need of reconstitution which occasions and which affords the genesis of the conscious distinction into sensory stimulus on one side, and motor response on the other. The stimulus is that phase of the forming co-ordination which represents the conditions which have to be met in bringing it to a successful issue: the response is that phase of one and the same forming co-ordination which gives the key to meeting these conditions, which serves as instrument in effecting the successful co-ordination. They are, therefore, strictly correlative and contemporaneous." CHRISTISON.